## **TV-10-2 Southwest Pass Shoreline Protection**

**Coast 2050 Strategy Coastwide** – Regional Strategy #12 – Maintain shoreline integrity and stabilize critical areas of Vermilion, East and West Cote Blanche, Atchafalaya, Caillou, Terrebonne and Timbalier Bays.

**Project Location** - Region 3 – Teche-Vermilion Basin – Iberia and Vermilion Parishes. The project is located between Marsh Island and Louisiana State Wildlife Refuge and Game Preserve.

**Problem** – Extensive widening of Southwest Pass due to land loss associated with shoreline erosion has increased tidal variations and salinities in the Vermilion Bay estuary. In turn, emergent wetlands impacted by such changes have reverted to a lesser productive, brackish/saline habitat type and interior marsh losses have increased. Continued erosion of the landbridge/peninsula area would also reduce the area's effectiveness as a mainland barrier to gulf storm surge and wave energy.

**Goals** – This goal of this project is to reduce or eliminate shoreline erosion in critical areas so as to stabilize and maintain current tidal flows and variations within the Vermilion Bay estuary to preserve current environmental conditions.

**Proposed Solution** – Maintain the current width and flow pattern of Southwest Pass by installing a rock dike around the perimeter of Lighthouse Point and providing rock revetment protection around the perimeter of Southwest Point. The rock dike and revetment will also parallel the Gulf of Mexico and Vermilion Bay shoreline to some extent to prevent tidal currents from circumventing the restriction at the pass and breaching adjacent marsh areas. A low degree of maintenance is expected to be required for this project.

**Project Benefits** – This project will benefit an area of 93 acres. Over the 20-year project life, there will be a net of 91 acres over the without -project condition.

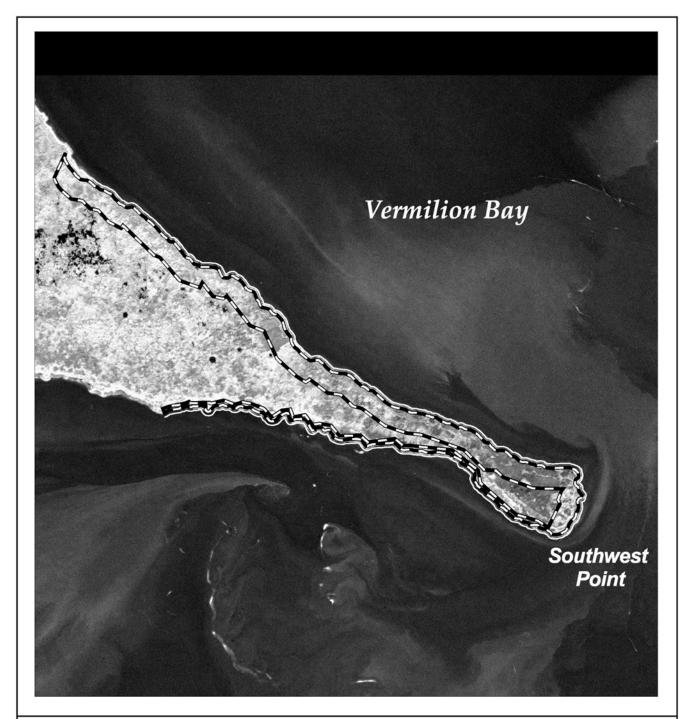
**Project Costs** – The total fully funded cost is \$14,659,800 and the fully funded first cost is \$9,687,600.

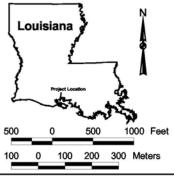
**Risk/Uncertainty and Longevity/Sustainability** There is a low degree of risk associated with this project because of the proven effectiveness of both techniques of shoreline protection. The project should continue providing benefits beyond 20 years after construction because of the type of project features.

Sponsoring Agency and Contact Person – USDA – Natural Resources Conservation Service

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Project area Project area

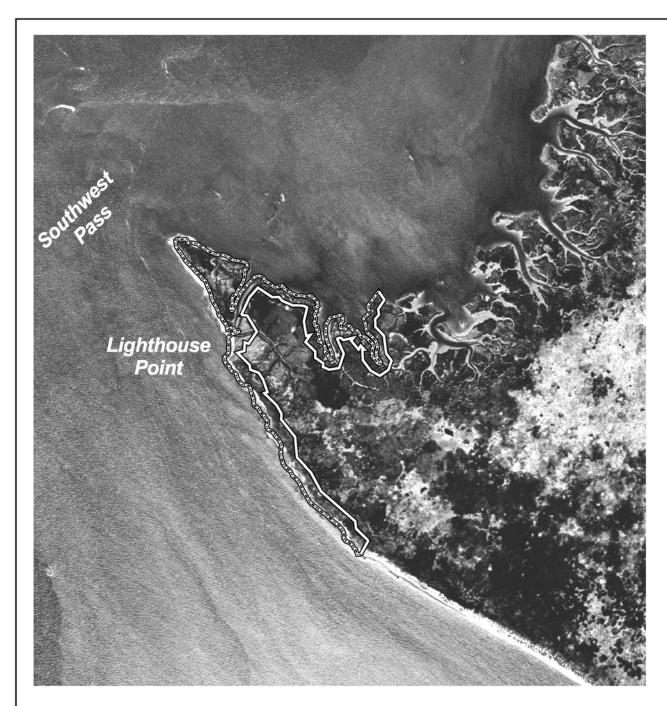
Data Source: U.S.Geological Survey National Wetlands Research Center Coastal Restoration Field Station

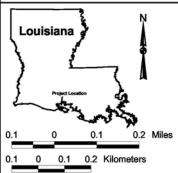
LA Department of Natural Resources Coastal Restoration Division

Map Date: November 15, 2001 Map ID: 200204123 Image Data: 1998 Digital Orthophoto Quarter Quads (DOQQS)

**CWPPRA PPL11** Region 3

Southwest Pass Hydrologic Restoration (TV-10-2) Southwest Point





Project area
Shoreline Protection

Data Source: U.S.Geological Survey National Wetlands Research Center Coastal Restoration Field Station

LA Department of Natural Resources Coastal Restoration Division

Map Date: November 15, 2001 Map ID: 200204143 Image Data: 1998 Digital Orthophoto Quarter Quads (DOQQS) CWPPRA PPL11 Region 3

Southwest Pass Hydrologic Restoration (TV-10-2) Lighthouse Point